

## **Descriptive title of the invention**

**virtual cash limited money card for purchasing,  
to be used mostly through the internet and  
communication systems.**

## **Introduction – background to the invention**

In the last period we are witnesses to a big development in the internet area in general and especially in the “virtual world”. Although this invention does not relate only to the internet, there is no doubt that the internet increases the need for this invention. In a virtual world like the internet’s in which we can travel between the sites, make purchases, buy deferent products – physical or virtual, and deferent services, it is only natural that we need also to have virtual money. Money bills which we can carry while we serf in the net and use as we wish. This invention comes to give an answer for this need, but it is more general and fits not only for internet usage, but also for use in making purchases not through the internet like on the phone, cable net, or the actual place in which the deal/purchase is made.

As known many purchases today are made through the phone, the internet and in deferent methods. Customers are interested in buying not only in the selling place itself but also through deferent communication means. Today the most abundant way is the use of credit cards. The customer passes the credit card number and some more details like the expiration date and/or the id number, and the selling body passes the debit/charge to the credit card company to authorize the payment and execute it. actually using this method the customer (owner of the credit card) is forced to pass to the selling body data/details which if stolen and/or used not correctly, could cause the customer and/or the credit card company and/or the insurance company a very big financial damage. It is possible that the data which the customer passed would be stolen by a third body which will use it badly and spend the customers money – in this situation it is possible that until the customer realizes this, a lot of time already passes and the financial damage can be very big. It also happens that the seller which gets the credit card’s details uses them latter badly in an unlegal way or even charging him by mistake for higher amounts then agreed. The risks mentioned are only few of the risks, and it is important to refer especially to the enormous development in the internet area in which the potential of credit card users is enormous and so is the potential of credit card fraud. The use of credit card through the internet scares many of the credit card’s companies customers and it undoubtedly one of the main reasons that the potential of selling through the internet is not exploited. These risks prevent many of the customers that are interested in making purchases/deals through the communication means like internet, telephone from doing so because of the dangers mentioned. Other payment means like bank deposit are usually complicated and expensive and not acceptable in small deals/purchases.

The invention described here comes to give a solution for this situation with the use of a virtual “card/bill” of money which will serve the customers in a resembling way to the use of cash money combined with a credit card. The uniqueness of the card is that it is limited in its money amount like every money bill, it does not have to be physical, it is more protected than a regular credit card, it can be passed from person to person like cash money, and it is possible according to the issuing company’s consideration to perform all the issuing process through the internet, telephone or in another way, and also to get information about the card through the internet, telephone or another way. The card/bill owner can use it only until the money it contains is finished. If the combination numbers which identify the card are stolen, it is clear that the damage is limited to the remainder of the money in the card. When the customer orders (buys) another card the numbers are new and the customer doesn’t have to worry. To this we should add the fact that stilling the combination numbers is not a simple task, it is clear that the motivation of thieves will grow smaller when they know that after hours of hard work and risk all they can benefit is a relatively small amount of money. In addition this method is secured almost completely against unlegal use of these cards, because of the fact that the card is limited and because of the unique way it is issued and used.

## **Description of the invention**

It is a virtual money “card/bill” with a unique identifier, which will be used by the consumers for purchasing through a computer network like the internet, the telephone, or even at the buying place itself. The card does not have to exist physically, and can exist in some representations (digital representation is recommended). The card is limited to an amount of money like a money bill (for example a card of 100 dollars or 1000 dollars etc). The card is identified by a card number and an identifier code number and/or some more details. A customer that had bought a card receives from the issuing company a card number and an identifier code number (the identifier code number can be constant or can change from purchase to purchase or every period of time) and can use it for purchasing through the internet, the telephone, a cable network, or in the buying place itself.

The card is limited to the amount of money which it was issued for, to the customer’s demand and thus the maximum risk in case of a fraud is the amount of money exists in the card. After the customer used all the money in the card, the card turns worthless and the issuing body will not allow anymore deals/purchases with this card. For the customer, the card is like a money bill with an identifier number and he/she can buy it from the issuing body (the issuer can also be a credit card company).

When a customer wants to use the card in order to buy a product he/she passes his/her credit card number and the identifier code number to the seller in a resembling way to how its done with a regular credit card (for example in a regular purchase in the phone or in the internet), but as opposed to the regular method, there is no obligation to demand from the card holder other identifying details in addition to the card number and the identifying code. The company that issued the card will get the debit/charge and will authorize it up to the maximum amount of money left in the card, but not above it. Actually the deal/purchase is made in a similar way to that of a regular credit card deal, but here there is a limit to an amount of money, the card is virtual and issued immediately, and when the amount of money is finished, the card turns worthless.

**The customer can use the card also for transference of money from person to another person** simply by buying a card and passing it’s combination of numbers to the person to whom he wants to pass the money. The person who got the details can use the card or ask to cash it in from the issuing company. In order to assure that the card will be passed to the full control of it’s new owner it is possible and recommended that another code, “**changing code**”, will be used, and only the person who also has this code can change the identifying card code

number and/or the card owner details. This code is not delivered in regular deals/transactions.

These facts turns the card to a kind of virtual money bill. The facts that the card is limited with money, and that after the money in it is finished it turns worthless, cause in fact that stilling the card numbers in the worst case will cause the customer or the insurance company damage in the amount of money left in the card. This way, a customer who bought a 50 dollar card for instance, knows that this is the maximum risk for him (the insurance company of course will be able to estimate damages in case of stilling). It is also clear that the motivation to still such cards is low since a thief who by chance get the combination numbers will only benefit a limited amount of money usually not big. Also if an identifying code which is changing per transaction or per a small period of time will be used, stilling these cards will be almost completely impossible.

The card can be bought also through the internet in a fast way in the company's internet site or in a different way, and the customer can also see in the internet details like balance of an existing card. Changing the owner name with the help of the "changing code", could also be done through the internet. Carrying out all these operations through a secured internet site will simplify the handling of these cards, reduce their costs and make their use convenient, simple and very fast.

## **Description of the drawings**

The drawings shown here describe possible stages for operating the model. The paragraph's numbers refer to the numbers that appear on the drawings. It should be noted that this is only one way to perform the model, and there may be other ways as well.

### **Stage A**

1. **Application** – at this stage the customer contacts the card issuing company. The contact is done by the phone, the internet, or in any other way (as mentioned before, it is possible that the customer will buy the cards in authorized shops/stores). At this stage the customer asks to issue for himself a card contained with a certain amount of money.
2. **issuing the card** – the issuing company, “issue” the card for the customer, meaning creating in the system a card number and an identifying code or codes and it is also recommended that it will create another code or password – “**changing code**” that the customer can use for changing the card details. The company delivers to the customer the unique combination of numbers for his card.

### **Stage B**

3. **delivering the card details** – the customer who decided to make a purchase contacts the seller and asks to purchase a certain product or a certain service. The customer will provide the seller with the card number and the relevant identifying code in order to purchase the product or service.
4. **Passing the card details for approval** – the seller will deliver the combination of numbers to the issuing company to be approved by it.
5. **Passing an approval or a refusal for the purchase** – the issuing company will check the card’s details. If the card exists, the identifying code fits it, and the card contains the amount requested, the purchase will be approved, and the company will give an authorization for it, to the seller.
6. **Closing the transaction and informing the customer** – the seller will close the transaction/deal as set between him and the customer.

### **Stage C**

7. **Delivering the money by the issuing company to the seller** – at this stage the purchase is already authorized. Now the issuing company will deliver the money to the product’s or service’s sellers. This stage is done

according to agreements between the issuing company and the sellers. It is reasonable that this stage will be done after all the rest of the stages. One possibility is to pay the sellers in a certain fixed date like in the 10'th of each month, and another possibility is to deliver the payment to the seller in a fixed time difference after the approval of every purchase or immediately after it. There may also be other options.

## **Detailed Description - Technical methods for the operation of the model**

The company issuing the cards can be a credit card company, and in this case it is reasonable that most of the infrastructure and the computerized system already exists.

### **Detailing:**

the issuing company will hold a computerized system. This system enables issuing cards immediately or in a very short time. Issuing a card is involved actually with giving a new card number which not yet exist in the system, and an identifying code number (one or more), and it is also recommended that another code or password which is called "changing code" which the system or the customer chooses, will be issued and with this code it will be possible to change the card details latter. After finding a combination of numbers as described here, the system will insert this combination to a reservoir (data base) which will contain the following details for the card:

1. Card number
2. An identifying code or a few identifying codes (one per each transaction or per each time period)
3. Another code or password - "changing code".
4. The customer's name and details like address, phone number, id number (recommended but not a must)
5. The amount of money contained in the card.
6. Issuing date.
7. Expiry date (if exists).

The issuing company will charge from the customer money for the card by charging his bank account or by charging his credit card or in another way. It is also possible that the customer will be charged only after he makes purchases in which case the issuing company will also save information of his bank account, or his credit card number so that it can charge him when he makes purchases.

The issuing company will deliver to the customer the selected combination of numbers, meaning his card number, the identifying number (or identifying numbers), and the additional code or password for changing (if issued).

When a customer decides to make a purchase he/she has to deliver the card number and the relevant identifying number to the seller. The seller

will deliver this data to the issuing company which will check in its data base if a card with this combination of numbers exists. If this combination of numbers exists, the company will check the balance in the customer's card, and if the balance is enough for the purchase, the purchase will be authorized and a message will be sent to the seller. The amount of money left in the card will be updated according to the purchase's cost, and the purchase's details and amount of money left in the card will be saved in the database.

The whole issuing process or part of it can be made through the internet, for example by a secured internet site which the issuing company will hold. This site will enable the customers to purchase virtual cards in a fast way. A customer which will enter the site will be able to fill a request for a card which will contain the amount of money he/she wants, and some more details according to the issuing company's demands. The customer will be able to pay for the card for example by credit card or in another way. After paying for the card the customer will receive through his email or through the internet site or in mail, or in modem fax, or in another way the new card's details, and the issuing company will update the system with the new card details.

In addition, a card owner can enter the issuing company's site and inquire for details and information like the balance of the card he/she owns. Changing the details with the help of the "changing code" can also be done through the internet site. These inquiries and changes can be done for example by entering the card number and/or the identifying code in the issuing company's site and executing/entering a request for the card details. In order to improve the security of the card issuing, the issuing company can send the customer the card number separated from the other code or codes, and it can also send them in different ways, for example: the card number will be sent through the internet site and the identifying code/codes will be sent by fax.

It is also possible that a virtual card owner will ask for his/her money back from the issuing company because of different reasons like: there is only a small amount of money left in the card, he/she is not interested in making anymore purchases or any other reason. In this case the issuing company will deliver the money back to the customer in an acceptable way on both sides like a check, a bank transfer or any other way. The issuing company will also update the balance of the card to 0 and will register the card in the data base as a closed card.